b) allowing the distance sensor to measure the viewing distance and to input the viewing distance into the central processing system;

c) allowing the central processing system to receive and analyze the viewing distance;

d) allowing the distance sensor to sample the viewing distance by repeating steps (b) and (c) over a period of time; and

e) allowing the central processing system to statistically analyze the sampled viewing distance.

4. The method of claim 3, wherein the central processing system is a computer system.

5. The method of claim 3, wherein the central processing system is accessible via Internet.

6. The method of claim 3, further comprising the step of notifying the user when the user is not situated at a proper viewing distance.

7. The method of claim 6, wherein the step of notifying the user comprises switching the display to a different program.

8. The method of claim 3, wherein the at least one distance sensor comprises more than one distance sensor.

9. A method of measuring ambient light level associated with use of a display by a user, comprising the steps of:

a) providing a display, at least one light sensor and a central processing system, wherein the light sensor is positioned in a known position relative to the display and is capable of inputting information into the central processing system, and the central processing system is capable of receiving and analyzing input from the light sensor;

b) allowing the light sensor to determine ambient light level;

c) allowing the light sensor to input the ambient light level into the central processing system; and

d) allowing the central processing system to receive and analyze ambient light level.

2 ~~10.~~ The method of claim 1 ~~9~~, further comprising the step of allowing the central processing system to suggest increasing or decreasing an amount of ambient light.

3 ~~11.~~ The method of claim 1 ~~9~~, wherein the central processing system is a computer system.

4 ~~12.~~ The method of claim 1 ~~9~~, wherein the central processing system is accessible via Internet.

5 ~~13.~~ The method of claim 1 ~~9~~, wherein the at least one light sensor comprises at least three light sensors.

6 ~~14.~~ A method of determining viewing distance between a user and a display and measuring ambient light level associated with use of the display, when the user is positioned in front of the display, comprising the steps of:

a) providing a display, at least one distance sensor, at least one light sensor, and a central processing system, wherein the distance sensor is positioned in a known position relative to the display and is capable of inputting information into the central processing system, the light sensor is positioned in a known position relative to the display and is capable of inputting information into the central processing system, and the central processing system is capable of receiving and analyzing input from the distance sensor and the light sensor;

b) allowing the distance sensor to determine the viewing distance;

c) allowing the distance sensor to input viewing distance into the central processing system;

d) allowing the light sensor to measure the ambient light level;

e) allowing the light sensor to input the ambient light level into the central processing system; and

f) allowing the central processing system to analyze viewing distance and ambient light level and to cause the results to be displayed.

7 ~~15.~~ The method of claim 6 ~~14~~, wherein the central processing system is a computer.

8 ~~16.~~ The method of claim 6 ~~14~~, wherein the central processing system is accessible via Internet.

9 ~~17.~~ The method of claim ~~14~~ 6, further comprising the steps of sampling the viewing distance over time.

10 ~~18.~~ The method of claim ~~14~~ 6, wherein the at least one distance sensor comprises more than one distance sensor.

11 ~~19.~~ The method of claim ~~14~~ 6, wherein the at least one light sensor comprises at least three light sensors.

12 ~~20.~~ A method of measuring amplitude of accommodation of a user of a display when the user is positioned in front of the display, comprising the steps of:

a) providing at least one distance sensor and a central processing system, wherein the distance sensor is positioned in a known position relative to the display and is capable of inputting information into the central processing system, and the central processing system is capable of receiving and analyzing input from the distance sensor;

b) allowing the user to position the user's eye at a distance from the display when the display first becomes blurry;

c) allowing the distance sensor to measure the viewing distance when the display first becomes blurry and inputting the viewing distance into the central processing system; and

d) allowing the central processing system to determine the amplitude of accommodation of the user.

13 ~~21.~~ The method of claim ~~20~~ 12, wherein the measurement is performed over a period of time to measure changes in the amplitude of accommodation over time.

14 ~~22.~~ A method of performing a color test on a user of a display, wherein the user is positioned in front of the display, comprising the steps of:

a) providing a display and a color test on the display;

b) providing a user-controlled input device and a central processing system, wherein the user-controlled input device is capable of inputting information into the central processing system, and the central processing system is capable of receiving and analyzing input from the user-controlled input device;

c) allowing the user to perform the color test;

d) allowing the user to input a response into the central processing system; and

e) allowing the central processing system to analyze the response.

23. The method of claim 22, further comprising the steps of repeating steps (c), (d) and (e) over a period of time to determine variance.

24. A method of monitoring blinking of a user of a display when the user is positioned in front of the display, comprising the steps of:

a) providing a display, an imaging sensor and a central processing system, wherein the imaging sensor is located in front of the user and is capable of inputting information to the central processing system, and the central processing system is capable of receiving and analyzing input from the imaging sensor;

b) allowing the imaging sensor to measure number of times the user blinks over a period of time; and

c) allowing the central processing system to receive and analyze input from the image sensor to determine blink rate over a period of time.

25. The method of claim 24, wherein the imaging sensor is a camera.

26. The method of claim 24, wherein the central processing system is a computer system.

27. The method of claim 25, wherein the central processing system is accessible via Internet.

28. The method of claim 24, further comprising the step of allowing the image sensor to take reference images of user with user's eyes being open and with user's eyes being closed.

29. A method of determining a user's visual acuity, when the user is positioned in front of a display, comprising the steps of:

a) providing at least one light sensor, a display, and a central processing system, wherein the light sensor is positioned in a known position relative to the display and is capable of inputting information into the central processing system, and the central processing system is capable of receiving and analyzing input from the light sensor;

b) allowing the display to display a visual acuity test;

c) allowing the light sensor to measure ambient light level and to input the ambient light level to the central processing system;

d) allowing the user to respond to the visual acuity test and to input the response to the central processing system; and

e) allowing the central processing system to analyze the user's acuity test response.

26 ~~30.~~ The method of claim ~~29~~ 25, further comprising the steps of: providing at least one distance sensor, wherein the distance sensor is positioned in a known position relative to the display and is capable of inputting information into the central processing system, and the central processing system is capable of receiving and analyzing input from the distance sensor, and allowing the distance sensor to determine the viewing distance and to input the viewing distance into a central process system.

27 ~~31.~~ The method of claim ~~29~~ 25, wherein the method of determining a user's visual acuity is performed over a period of time at the same ambient light level.

21 ~~32.~~ The method of claim ~~28~~ 20, wherein the step of displaying the visual acuity test comprises displaying a symbol and requiring the user to progressively indicate a feature in the symbol, while the feature in the symbol rotates and the symbol changes in size.

22 ~~33.~~ The method of claim ~~32~~ 21, wherein the symbol is a band, a ring or a letter "C".

23 ~~34.~~ The method of claim ~~32~~ 21, wherein the symbol is a letter "C," wherein the letter "C" comprises an opening, and the feature in the symbol is the opening.

24 ~~35.~~ The method of claim ~~32~~ 21, wherein the method comprises providing a software program, wherein the software program is capable of performing the steps comprising of:

a) causing the display to display a letter "C" as a 20/10 letter;

b) increasing the size of the letter "C" until it is discernible to the user;

c) detecting a response by the user when user discerns the letter "C";

d) requiring user to respond by identifying correct position of the letter "C";

e) accepting user's response;

f) rotating the letter "C" when user identifies the correct position of the letter "C";

g) repeating steps (d) and (e);

h) allowing the central processing system to analyze user's responses to determine the user's visual acuity;

wherein the size of the letter "C" is increased progressively each time if user is unable to identify the correct position of the letter "C," until a correct response is obtained.

28 ~~36.~~ The method of claim ~~29,~~ 25 wherein the central processing system is a computer system.

29 ~~37.~~ The method of claim ~~29,~~ 25 wherein the central processing system is accessible via Internet.

30 ~~38.~~ The method of claim ~~29,~~ 25 wherein the user is a patient who has a vision-related medical condition.

31 ~~39.~~ A method of determining glare associated with use of a display by a user, comprising the steps of:

a) providing a display, a plurality of light meters, and a central processing system, wherein the light meters are capable of detecting source of multi-directional light relative to the user and of inputting information to the central processing system, and the central processing system is capable of receiving and analyzing input from the light meters;

b) allowing the light meters to detect light sources and inputting light source information to the central processing system; and

c) allowing the central processing system to receive and analyze input from the light meters to determine glare.

~~32~~ ~~40.~~ The method of claim ~~39,~~ 31 wherein the central processing system is a computer system.

33 ~~41.~~ The method of claim ~~39,~~ 31 wherein the central processing system is accessible via Internet.

34 ~~42.~~ A method of monitoring a patient's vision remotely comprising the steps of:

a) allowing the patient to perform a vision test using a display at a remote site;

b) allowing the patient to input information from the vision test into a central processing system;

c) allowing the input information to be analyzed; and

d) allowing results from the analysis to be displayed.

35 ~~43.~~ The method of claim ~~42~~ 34, wherein the subject is selected from the group consisting of: one who has undergone ocular surgery, one who requires monitoring before surgery, one who is taking medication that may affect vision, and one who has an ongoing medical problem that is vision related.

36 ~~44.~~ A method of measuring productivity of a user when user is positioned in front of a display, comprising the steps of:

a) providing a display, at least one distance sensor, at least one light sensor, at least one imaging sensor and a central processing system, wherein the distance sensor, the light sensor and the imaging sensor are each capable of inputting information into the central processing system, and the central processing system is capable of receiving and analyzing input from the distance sensor, the light sensor and the imaging sensor;

b) allowing the sensors to detect typing, mouse clicks, and blinking of the user over a period of time;

c) allowing the central processing system to analyze typing speed, mouse clicks, blink rate and time elapsed to determine productivity.

45. A method of providing an ergonomically controlled workstation, comprising the steps of:

a) providing a display, a keyboard, at least one distance sensor, each of which is capable of inputting information into a central processing system;

b) providing a central processing system that is capable of receiving and analyzing input from the display, keyboard and each sensor;

c) providing a mechanical apparatus that is capable of automatically moving a display in one, two, or three dimensions to reduce eyestrain, or improve viewing or relax or exercise head, neck, or other muscles, in response to input from the central processing system.

46. The method of claim 45, further comprising the step of providing at least one light sensor, wherein the light sensor is capable of inputting information into the central processing system.

47. The method of claim 45, further comprising the step of providing an LED that allows for correction of viewing angle of a user, when the user is positioned in front of the display.

48. The method of claim 45, further comprising the step of providing at least one selected from the group consisting of: a noise sensor, a temperature sensor, a humidity sensor and an imaging sensor, wherein each sensor is capable of inputting information into the central processing system.

49. The method of claim 45, wherein the central processing system is a local computer system.

50. The method of claim 45, wherein the central processing system is accessible via Internet.

51. The method of claim 45, further comprising a mouse that is capable of inputting information into the central processing system.

52. The method of claim 45, wherein the display is a computer monitor or a flat panel.

~~53.~~ A software program for performing a visual acuity test of a user, wherein the software program is configured to perform the steps comprising of:

a) causing a display to display a letter "C" as a 20/10 letter;

b) increasing the size of the letter "C" until it is discernible to the user;

c) detecting a response by the user when user discerns the letter "C";

d) requiring the user to respond by identifying correct position of the letter "C";

e) accepting the user's response;

f) rotating the letter "C" when user identifies the correct position of the letter "C";

g) repeating the steps (d), (e) and (f);

h) allowing the central processing system to analyze user's responses to determine the user's visual acuity;

wherein the size of the letter "C" is increased progressively each time if user is unable to identify the correct position of the letter "C," until a correct response is obtained.

54. A software program for monitoring a user's vision, wherein the software program is configured to perform at least two functions selected from the group consisting of:

a) accepting and recording input regarding the user's medical history, medications, or vision profile;

b) accepting and recording real time input of user's viewing distance while performing vision testing;

c) adjusting test pattern size in relation to viewing distance;

d) displaying recommendations for optimizing environmental lighting prior to vision testing;

e) accepting input and tracking real time user vision performance over time;

f) transmitting recorded information and analyses of distance and lighting;

g) accepting and recording productivity measurements; and

h) transmitting analyses to user or user's caregiver

~~55.~~ 38 A system for monitoring use of a display by a user when the user is position in front of the display, comprising:

a) a display that is capable of display information from inputted into or from a central processing system;

b) at least one distance sensor that is capable of measuring viewing distance and inputting information into the central processing system;

c) at least one light sensor that is capable of detecting ambient light level and is capable of inputting information into the central processing system; and

d) the central processing system that is capable of receiving and analyzing information received from the distance sensor and light sensor.

~~56.~~ 39 The system of claim ~~55,~~ 38 further comprising a mechanical apparatus that is capable of moving the display in one, two, or three dimensions in response to input from the central processing system.

40 57. The system of claim 55, further comprising at least one sensor selected from the group consisting of a noise sensor, a temperature sensor, a humidity sensor and an imaging sensor, each being capable of inputting information into the central processing system.

41 58. The system of claim 55, wherein the 3 light sensors are positioned to determine source of multidirectional light relative to the user.

42 59. The system of claim 55, further comprising an image sensor, wherein the image sensor is capable of inputting information into the central processing system.

43 60. The system of claim 59, wherein the image sensor is a camera.

44 61. The system of claim 59, wherein the image sensor is capable of detecting blinking over a period of time and the central processing system is capable of analyzing blink rate.

45 62. The system of claim 55, wherein the mechanical apparatus provides for automatically moving the display to adjust for accommodative and visual changes of the user.